

IN THE CLAIMS

This listing of claims will replace all prior versions, and listings, of claims in the application. An identifier indicating the status of each claim is provided.

Listing of Claims

1. (Currently Amended) A data transfer apparatus for connecting a plurality of buses and for transmitting data through a first bus to a second bus according to destination information related to the data, the data transfer apparatus being connected to the second bus through a second data transfer apparatus, the data transfer apparatus comprising:

transferring means for transferring the data from the data transfer apparatus to the second data transfer apparatus according to the destination information;

determining means for determining, according to the destination information, whether a node serving as a destination of the data is connected to the second bus ;

wherein, when the determining means determines that the node is not connected, a data transmission source receives a predetermined error information signal,

wherein the predetermined error information signal prevents retransmission;

wherein at least one packet of the data, transmitted to the node that is not connected, is processed as an error packet;

wherein the destination information comprises a node ID and a bus ID; and

wherein the data transfer apparatus is formed of an IEEE-1394 bridge conforming to the BRAN specification.

2. (Previously Presented) The data transfer apparatus according to claim 1, wherein the means for determining determines, according to the destination information, whether the bus to which the node serving as the destination of the data is connected exists on a network, and

wherein when the bus does not exist, transmits predetermined error information to the data transmission source.

3 - 4. (Canceled)

5. (Currently Amended) A network system comprising:
a plurality of buses connected through a data transfer apparatus, the data transfer apparatus for connecting the plurality of buses and for transmitting data transferred through its own bus to a second bus according to destination information attached to the data,

wherein the data transfer apparatus is connected to the second bus through a second data transfer apparatus, and the data transfer apparatus further comprises:

transferring means for transferring the data from the data transfer apparatus to the second data transfer apparatus according to the destination information;

determining means for determining, according to the destination information, whether a node serving as a destination of the data is connected to the second bus, and, when it determines that the node is not connected, a data transmission source receives a predetermined error information,

wherein the predetermined error information signal prevents

retransmission;

wherein at least one packet of the data, transmitted to the node that is not connected, is processed as an error packet;

wherein the destination information comprises a node ID and a bus ID;

wherein the data transfer apparatus is formed of an IEEE-1394 bridge conforming to the BRAN specification.

6. (Previously Presented) The network system according to claim 5,

wherein the means for determining determines according to the destination information whether the bus to which the node serving as the destination of the data is connected exists on a network, and, when the bus does not exist, transmits predetermined error information to the data transmission source.

7 - 8. (Canceled)

9. (Currently Amended) A data transfer method for a data transfer apparatus

for connecting buses and for transmitting data transferred through a first bus to a second bus according to destination information attached to the data, the data transfer apparatus being connected to the second bus through a second data transfer apparatus, the data transfer method comprising:

a transferring step of transferring the data from the data transfer apparatus to the second data transfer apparatus according to the destination information;

a determining step of determining, according to the destination information, whether the node serving as a destination of the data is connected to one of the buses; and
a transmitting step of, when it is determined that the node is not connected, transmitting predetermined error information to a data transmission source,
wherein the predetermined error information signal prevents retransmission;
wherein at least one packet of the data, transmitted to the node that is not connected, is processed as an error packet;
wherein the destination information comprises a node ID and a bus ID;
wherein the data transfer apparatus is formed of an IEEE-1394 bridge conforming to the BRAN specification.

10. (Previously Presented) The data transfer method according to claim 9, wherein, in the transmitting step, it is determined according to the destination information whether the bus to which the node serving as the destination of the data is connected exists on a network, and, when it is determined that the bus does not exist, predetermined error information is transmitted to the data transmission source.

11 - 12. (Canceled)